## 75-Acre Public Timber Sale

## Background

Clearcut harvest proposal on 75 acres in a state forest that has a larger landscape forest plan and a still larger habitat conservation plan (70 year commitment to sustainable tree growth and habitat protection). Cable yarding, loaders, tracked ground-based shovels and other logging equipment will be used for removing and loading logs. Some road construction, maintenance, and abandonment will accompany the proposal. Road construction requires gravel. The rock pit may be new but would be on site or nearby on public land. There would be no commercial use of the rock pit. Some burning at landings would likely occur. Log trucks will haul logs to mills. This description does not include activities at a lumber mill or beyond.

Two EIS documents already cover the Sustainability of the harvest and the wildlife habitat protection commitment across all of western Washington. A forest land planning unit EIS covers 150,000 acres, including the proposal area. The proposal is also within the EIS analysis area for a 40,000 acre state forest plan.

Harvest methods have changed little in last ten years and the same number of log trucks will haul the same number of log loads to the same log mills. The milled wood products will still be used for home construction. Cable yarding equipment, loaders, tracked ground-based shovels and all logging equipment is much the same as 10 years ago. Fewer new roads are needed each year to access the timber than was historically the case (on forest-wide basis). Rock-pit expansion to build or rebuild roads is less than or typical of historical annual rock pit use. Older rock pits are reclaimed and planted back to timber.

## **CO<sub>2</sub> Calculation Assumptions**

The calculations for log trucks are based on six miles per gallon of diesel fuel, 17 gallons per 100 mile round trip to sawmill, and 22.38 pounds of CO<sub>2</sub> per gallon of diesel. Similar assumptions can be used for the other heavy equipment, but may be based on hours of use per day, or gallons of diesel fuel actually used rather than miles per gallon. It should also be noted that the log hauling constitutes by far the largest share of all the emissions.

## **Notes**

The Test Case Worksheet for the 75-acre timber sale is not that difficult to calculate and has been filled out as a test, regardless of whether there is no net increase in forest emissions since 1990 or possible decreases based on management practices for the larger forest area. Please see attached 75-acre project level analysis on the Test Case Worksheet.

At the 150,000 acre forest planning level assume we already know roughly 1,200,000 pounds of  $CO_2$  are emitted per year from typical log truck trips. The Governor's Climate Change Framework Legislation (HB 2815) only requires reporting by 2010 for motor vehicle fleets exceeding 5,511,500 pounds of carbon per year. The EIS for the 150,000 acre sustainable forest planning unit might be the best place for these calculations.

Project-level timber harvests might become green-listed or exempt from the GHG calculation part of SEPA analysis if already addressed by a larger scale sustainable forest land plan. Forest carbon-sink sequestration calculations may not be needed where land is not converted out of forest use. Forest managers might want to calculate carbon sequestration to take credit for long term carbon storage gains via management practices such as commercial thinning and marketing of thinning products for house construction (another carbon sink). Old forests eventually cease to add carbon to their stockpile of stored carbon and release more carbon from decay than they store in growth. Harvesting large trees and storing the carbon in lumber in buildings to replant fast-growing trees can maintain or improve carbon storage. Conversions out of forest use destroy the sink.